

ABSTRACT OF THE DISCLOSURE

A portable radio system, a portable radio equipment to be used in the same and a frequency error prediction method can be adapted to large frequency error by making tap number smaller and frequency error smaller. The portable radio system employs an automatic frequency control for detecting a frequency shift of an internal oscillator of a portable radio equipment with reference to a received wave transmitted from a base station having higher precision of frequency and adjusting the frequency of the internal oscillator by feeding back the frequency shift to the internal oscillator. Coordinate rotation digital computation (CORDIC) is employed for calculation of arctangent in the automatic frequency control.